ATARI PUNK CONSOLE MANUAL EN

INTRODUCE

VAEMI Standalone Synthesizer: Atari Punk Console

VAEMI's Atari Punk Console features a circuit design that operates with two oscillators and the modulation between these oscillators. Based on the "Stepped Tone Generator" circuit developed by Forrest M. Mims III in the early 1980s, this design is one of the significant milestones in electronic music history.

Thanks to the two oscillators, it offers the possibility to select harmonic degrees based on the fundamental frequency. This feature allows users to create melodic arpeggios.

In this synthesizer by VAEMI, the oscillators' frequencies are made light-sensitive. With LDR (Light Dependent Resistor) sensors, it is possible to modify the frequencies of the oscillators with light levels. This feature enables the device to be used interactively. Additionally, when the LDRs are off, touching them introduces your body resistance into the circuit, effectively making them function as LFOs. There are ON/OFF buttons available to control the opening and closing functions of the LDRs, allowing you to control the light sensitivity as desired.

The device offers different options for the user to choose the continuity of the sound: you can select between a button-controlled mode or a drone mode that continuously produces sound. You can control the sound level using the VCA CV input, which integrates easily with your other instruments. There is also a master volume control potentiometer to adjust the overall sound level.

A button is provided to control the filter's on/off function, allowing for the filtration of high frequencies from the sound.

It has 3.5mm jack inputs and outputs with CV (Control Voltage) inputs, making it easy to play with a keyboard or sequencer. The control inputs work between 0-5V, and each control input is protected.

The power requirement can be met with a 9V-18V adapter or a portable battery.

VAEMI offers this product both as a finished product and as DIY (Do It Yourself) kits.

INTRODUCE

Atari Punk Console Features

- Two oscillators: Allows the selection of harmonic degrees based on the fundamental frequency.
- LDR (Light Dependent Resistor) sensors: Provides the ability to change the oscillator frequencies with light levels.
- Interaction with body resistance when LDRs are off: Touching the LDRs makes them function as an LFO.
- LDR ON/OFF buttons: Control the ldr.
- Mode Selection: Choose between a button-controlled mode or a drone mode that continuously produces sound.
- Master Volume Potentiometer: Adjust the overall sound level.
- Filter on/off button: Allows the filtering of sound.
- Three CV inputs:
- CV input for Oscillator 1.
- CV input for Oscillator 2.
- VCA (Voltage Controlled Amplifier) CV input.
- 3.5 mm jack inputs and outputs: Facilitates integration with CV (Control Voltage) inputs.
- Power source: Can be powered by a 9V-18V adapter or a portable battery.
- Completed product and DIY kit options: Both pre-assembled sets and DIY kits for users to build their own instruments.

Dimensions: 130mm (length) x 70mm (width) x 60mm (height)

Power Consumption and Power Supply Information

Battery Usage

Can operate with a 9V battery and draws approximately 10mA of current. This equals a power consumption of 0.09W.

Adapter Usage

Can also be used with adapters providing a DC voltage of 8-18V.

The current provided by the adapter must be at least 20mA for the device to function. In this case, the power consumption may range from 0.05W to 0.18W, depending on the load requirements.

Inputs

CV 1: 0-5VDC (protected against reverse polarity and high voltage. It is still recommended to use within the specified levels.)

CV 2: 0-5VDC (protected against reverse polarity and high voltage. It is still recommended to use within the specified levels.)

VCA CV: 0-5VDC (protected against reverse polarity and high voltage. It is still recommended to use within the specified levels.)

CV1 and CV2 inputs have an impedance of 10k, while the VCA CV IN has an impedance of 50k.

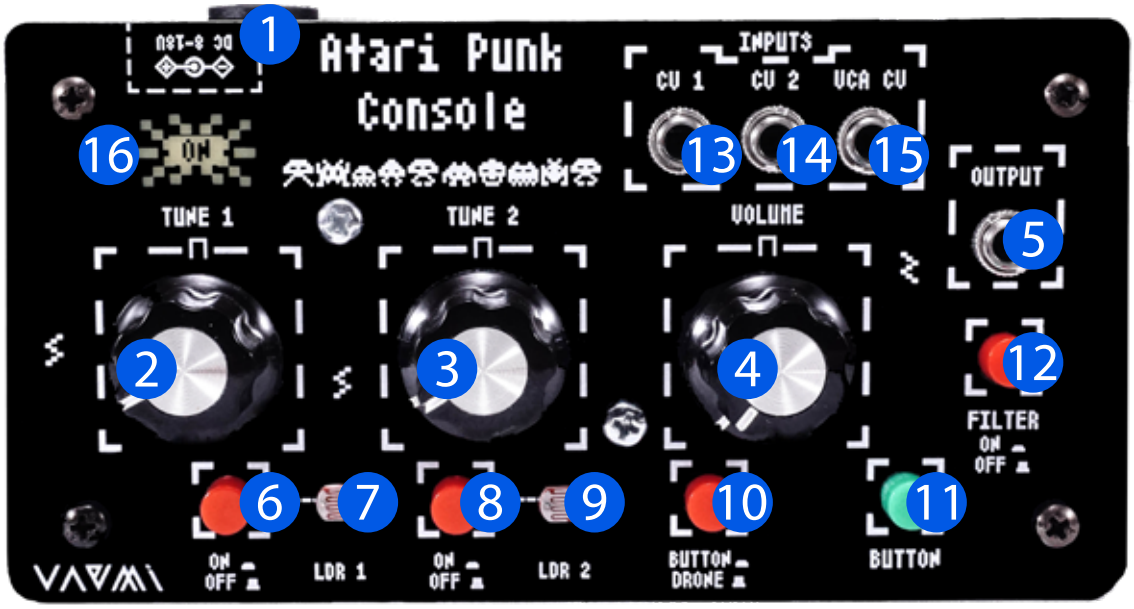
(Input impedance values were tested at a frequency of 1 kHz with a 1 Vpp sine wave.)

Output

Output Level: 4.25Vpp (maximum)

The output has an impedance of 1k ohms.

FRONT PANEL



1. 2.1mm DC jack socket with the positive center for power input.
2. Osc. 1 - Tune
3. Osc. 2 - Tune
4. Output Volume
5. Output Jack
6. LDR 1 On/Off Switch (affects Osc 1)
7. LDR 1 - (Light Dependent Resistor)
8. LDR 2 On/Off Switch (affects Osc 2)
9. LDR 2 - (Light Dependent Resistor)
10. On/Off Switch for Button or Drone
11. When you press the button in button mode, it outputs sound
12. Filter On/Off Switch
13. Osc. 1 CV In
14. Osc. 2 CV In
15. VCA CV In
16. Power Light

WARRANTY CONDITIONS

Diy kits are not covered by Vaemi warranty. Vaemi is not responsible for and accepts no responsibility for assembly errors or other problems with DIY kits.
Vaemi gives a two-year warranty on this product when you get it assembled.

Vaemi gives a one-year warranty for this product. The warranty period starts after the day you buy the product. (A proof of purchasing / a bill is required). Mistakes such as using the wrong power supply, connecting the cable to the bus board or the module in the wrong way, using a faulty flat (ribbon) cable, taking off the components, changing the front board, forwarding an output to another one will take the product out of warranty. In such a case, you will need to pay the normal service fee. Vaemi is not responsible, and will not take responsibility, for the damage that the product or the user may face because of operating the product. During the warranty period, a faulty product will be repaired by Vaemi for free. Shipping fees for sending the product back to Vaemi will be paid by the buyer.
For your further questions, please contact us on vaemisynth@gmail.com.

CE/REACH Compliant/RoHS Compliant
All Vaemi product are assembled with parts and materials that are compliant with CE/REACH/RoHs standards.

made in Türkiye